



# EXPRESS NORTH LANGE 1-25

### **Johnstown to Fort Collins**

Colorado Department of Transportation & Contractor

### Book 3

## APPLICABLE STANDARDS, DATA, AND REPORTS

North I-25: Johnstown to Fort Collins
Design-Build Project

DRAFT CONTRACT

February XX, 2018

PROJECT NO.: IM 0253-255 SUBACCOUNT NO.: 21506

### APPLICABLE STANDARDS, DATA and REPORTS

The latest, current version of the specified standards, data, and reports at the time of the Proposal Due Date including all interim revisions and updates shall be used unless specified otherwise. Copies of reports available at CDOT.

The Project-Specific Standards, Data, and Reports are listed by technical discipline for convenience only, and accordingly, such listing shall not be interpreted as limiting the application of such standards, data, and reports only to the specified technical disciplines if they are also applicable to other technical disciplines.

#### **Availability Legend**

IS = Industry standard, Not supplied with RFP

N= Not Yet Available

S = Included in RFP, Supplied with RFP

<u>Date Issued:</u> Date the Document was listed or supplied with the RFP

Project-Specific Standards, Data, and Reports				
Doc#	Document	Date Issued	Availability	
3.1	Environmental Documents			
3.1.01	North I-25 Final Environmental Impact Statement	1/27/17	IS	
3.1.02	2011 North I-25 Record of Decision (ROD1)	1/27/17	IS	
3.1.03	Revised ROD1 between SH 392 and SH 14	9/29/17	IS	
3.1.04	Reevaluation of ROD1 and FEIS to revise the selected alternative between SH 392 and SH14	9/29/17	IS	
3.1.05	Reevaluation of Revised ROD1 for the base case between SH 392 to SH 14 included in the Final RFP	9/29/17	IS	
3.1.06	North I-25 ROD4 SH 56 to SH 392	5/5/17	IS	
3.1.07	Reevaluation of ROD4 for the base case between SH 56 to SH 392 included in the Final RFP	9/29/17	IS	
3.1.08	US34 EA/FONSI	1/27/17	IS	
3.1.09	Reevaluation of US 34 FONSI (July 2007) for the bridge over I-25	9/29/17	IS	
3.1.07	Section 404 Permit	1/27/17	S	
3.1.08	CDOT Reevaluation Form #1399	1/27/17	IS	
3.1.09	CDOT Categorical Exclusion Determination #128	1/27/17	IS	
3.2	Geotechnical			
3.2.01	I-25 North Final Preliminary Subsurface Investigation Data Report SH402 to UPRR	3/31/17	S	
3.2.02	Geotechnical Investigation		N	

Draft Contract 1 February XX, 2018

Project-Specific Standards, Data, and Reports			
Doc#	Document	Date Issued	Availability
3.2.03	Segment 7 I-25 North Final Existing Pavement Investigation Data Report	4/21/17	S
3.3	Drainage		
3.3.01	Internationally Left Blank		
3.4	Other		
3.4.01	FHWA Interstate Access Report (IAR)	5/5/17	S
3.4.02	FHWA Minor Interchange Modification Request (MIMR)	9/29/17	S
3.4.03	Millennium General Development Plan (GDP) Criteria	1/27/17	S

General Standards, Data, and Reports			
Doc#	Document	Date Issued	Availability
N/A	2014 Interim New Development Redevelopment, As amended by Colorado Department of Public Health and Environment	1/27/17	IS
N/A	23 CFR 637 Construction Inspection and Approval	1/27/17	IS
N/A	23 CFR 645 Utilities & 23 CFR 646 Railroads	1/27/17	IS
N/A	23 CFR 650 Subpart A Location and Hydraulic Design of Encroachments on Flood Plains & Subpart B Erosion and Sediment Control on Highway Construction Projects	1/27/17	IS
N/A	23 CFR 710.313 Design-build projects	1/27/17	IS
N/A	23 CFR 772 – Procedures for Abatement of Highway Traffic Noise and Construction Noise	4/21/17	IS
N/A	23 CFR 774 Parks, Recreation Areas, Wildlife and Waterfowl Refuges, and Historic Sites	1/27/17	IS
N/A	29 CFR 1910, Federal Occupational Safety and Health Standards (Construction Industry)	1/27/17	IS
N/A	29 CFR 1910, Federal Occupational Safety and Health Standards (General Industry)	1/27/17	IS
N/A	29 CFR 1926.850, Federal Occupational Safety and Health Standards (Demolition)	1/27/17	IS
N/A	4 CCR 723-7 Rules Regulating Railroads, Rail Fixed Guideways, Transportation by Rail, and Rail Crossings	1/27/17	IS
N/A	44 CFR 59-80 FEMA National Flood Insurance Program Regulations	1/27/17	IS
N/A	49 CFR 24, Uniform Relocation Assistance and Real Property Acquisition for Federal and Federally-Assisted Programs	1/27/17	IS
N/A	AASHTO AWS D1.5 M- D 1.5, Bridge Welding Code	1/27/17	IS
N/A	AASHTO Guide for Development of Bicycle Facilities	1/27/17	IS
N/A	AASHTO Guide for High-Occupancy Vehicle Facilities	1/27/17	IS
N/A	AASHTO Guide Specifications for Design and Construction of Segmental Concrete Bridges	1/27/17	IS
N/A	AASHTO Guide Specifications for Fracture Critical Non-Redundant Steel Bridge Members	1/27/17	IS

General Standards, Data, and Reports			
Doc#	Document	Date Issued	Availability
N/A	AASHTO Guide Specifications for Horizontally Curved Steel Highway Bridges	1/27/17	IS
N/A	AASHTO Guide Specifications for Structural Design of Sound Barriers	1/27/17	IS
N/A	AASHTO LRFD Bridge Design Specifications	1/27/17	IS
N/A	AASHTO LRFD Guide Design Specifications for Bridge Temporary Works	1/27/17	IS
N/A	AASHTO LRFD Guide Specifications for Design of Pedestrian Bridges	1/27/17	IS
N/A	AASHTO M-203 Standard Specification for Steel Strand, Uncoated Seven-Wire for Concrete Reinforcement	1/27/17	IS
N/A	AASHTO Manual for Bridge Evaluation	1/27/17	IS
N/A	AASHTO Policy on Geometric Design of Highways and Streets	1/27/17	IS
N/A	AASHTO Roadside Design Guide	1/27/17	IS
N/A	AASHTO Standard Specifications for Highway Bridges	1/27/17	IS
N/A	AASHTO Standard specifications for Structural Supports for Highway Signs, Luminaries and Traffic Signals	1/27/17	IS
N/A	AASHTO Ware Pavement ME Design Program	1/27/17	IS
N/A	AASHTO/NSBA Steel Bridge Collaboration Shop Detail Drawing Review/Approval Guidelines	1/27/17	IS
N/A	American Disabilities Act Accessibility Guidelines	1/27/17	IS
N/A	American National Standard Institute (ANSI) – ANSO A300- 1995	1/27/17	IS
N/A	American Railway Engineering and Maintenance-of-Way Association (AREMA) Manual for Railway Engineering	1/27/17	IS
N/A	American Society of Civil Engineers (ASCE) - C-I 38-02, Standard Guidelines for the Collection and Depiction of Existing Subsurface Utility Data	3/31/17	IS
N/A	ANSI Z60.1, American Standard for Nursery Stock	1/27/17	SI
N/A	Applicable FEMA guidelines for LOMR/CLOMR	1/27/17	IS
N/A	ASTM A-416 Standard Specification for Low-Relaxation, Seven-Wire Steel Strand for Prestressed Concrete	1/27/17	IS
N/A	ASTM D-1143 Standard Test Methods for Deep Foundations Under Static Axial Compressive Load	1/27/17	IS
N/A	ASTM Standard Specification Manual	1/27/17	IS
N/A	ATSSA Quality Guidelines for Work Zone Traffic Control Devices	1/27/17	IS
N/A	BNSF Railway Guidelines for Railroad Grade Separation Projects	1/27/17	IS
N/A	CDHPE Colorado Air Quality Control Commission Regulation No. 1	1/27/17	IS
N/A	CDOT Asbestos-Contaminated Soil Management Standard Operating Procedure (SOP)	1/27/17	IS

Book 3 - Applicable Standards, Data, and Reports

General Standards, Data, and Reports			
Doc#	Document	Date Issued	Availability
N/A	CDOT Black-Tailed Prairie Dog Policy	1/27/17	IS
N/A	CDOT Brand Guidelines	1/27/17	S
N/A	CDOT Branding Standards Guidelines	1/27/17	S
N/A	CDOT Bridge Design Detail Manual	1/27/17	IS
N/A	CDOT Bridge Design Manual	1/27/17	IS
N/A	CDOT Bridge Design Technical Memorandum	1/27/17	IS
N/A	CDOT Bridge Rating Manual	1/27/17	IS
N/A	CDOT Bridge Structural Worksheets (www.dot.state.co.us/Bridge/Worksheets/Worksheets.htm)	1/27/17	IS
N/A	CDOT Cable Barrier Guide	1/27/17	IS
N/A	CDOT CADD Manual	1/27/17	IS
N/A	CDOT Construction Manual	1/27/17	IS
N/A	CDOT Contract Management and Compliance Reference Manual	3/17/17	IS
N/A	CDOT Drainage Design Manual	1/27/17	IS
N/A	CDOT Erosion Control & Stormwater Quality Guide	1/27/17	IS
N/A	CDOT Field Materials Manual	1/27/17	IS
N/A	CDOT Form 250	1/27/17	IS
N/A	CDOT Form 438	1/27/17	IS
N/A	CDOT Form 444	1/27/17	IS
N/A	CDOT Form 730	1/27/17	IS
N/A	CDOT Functional Assessment of Colorado Wetlands (FACWet) methodology	1/27/17	IS
N/A	CDOT Guidelines for Developing Traffic Incident Management Plans for Work Zone	1/27/17	IS
N/A	CDOT Highway Maintenance Levels of Service Manual	1/27/17	IS
N/A	CDOT Laboratory Manual of Test Procedures	1/27/17	IS
N/A	CDOT Lighting Design Guide	1/27/17	IS
N/A	CDOT Mechanistic-Empirical Pavement Design Manual	1/27/17	IS
N/A	CDOT Municipal Separate Storm Sewer (MS4) NPDES Permit www.dot.state.co.us/environmental/envWaterQual/wqms4.asp	1/27/17	IS
N/A	CDOT New Development and Redevelopment (NDRD) Program Guidelines	1/27/17	IS
N/A	CDOT Noise Analysis and Abatement Guidelines	1/27/17	IS
N/A	CDOT Pipe Material Selection Guide	1/27/17	IS
N/A	CDOT Project Development Manual	1/27/17	IS
N/A	CDOT Research Reports	1/27/17	IS
N/A	CDOT Retro Reflective Sheeting Materials Guide	1/27/17	IS
N/A	CDOT Revisions to Project Development Manual	1/27/17	IS

Book 3 – Applicable Standards, Data, and Reports

General Standards, Data, and Reports			
Doc#	Document	Date Issued	Availability
N/A	CDOT Right of Way Manual	1/27/17	IS
N/A	CDOT Roadway Design Guide	1/27/17	IS
N/A	CDOT Sign Design Manual	1/27/17	IS
N/A	CDOT Standard Plans, M & S Standards	1/27/17	IS
N/A	CDOT Standard Specifications for Road and Bridge Construction - 2017	9/20/17	IS
N/A	CDOT Supplement to Standard Highway Signs	1/27/17	IS
N/A	CDOT Survey Manual	1/27/17	IS
N/A	CDOT Utility Accommodation Code	1/27/17	IS
N/A	CDOT Work Zone Safety and Mobility Rule	1/27/17	IS
N/A	City of Fort Collins Amendments to the UDFCD Criteria Manual	1/27/17	IS
N/A	City of Fort Collins Floodplain Modeling Report Submittal Guidelines	1/27/17	IS
N/A	City of Loveland Site Development Performance Standards and Guidelines	06/30/17	IS
N/A	City of Loveland Storm Drainage Criteria (Addendum to UDFCD Criteria Manual)	1/27/17	IS
N/A	Clean Water Act	1/27/17	IS
N/A	Colorado Department of Transportation Region 4 Lane Closure Strategy	1/27/17	IS
N/A	Colorado Office of Archaeology and Historic Preservation (OAHP) standards and 36 CFR 800.11	1/27/17	IS
N/A	Colorado Parks and Wildlife General Provisions	1/27/17	IS
N/A	Colorado Parks and Wildlife Recommended Survey Protocol and Actions to Protect Nesting Burrowing Owls When Conducting Prairie Dog Control	1/27/17	IS
N/A	Colorado Voluntary Clean-up Program (VCUP)	1/27/17	IS
N/A	Colorado Water Conservation Board Floodplain and Stormwater Criteria Manual	1/27/17	IS
N/A	Colorado Water Conservation Board Rules and Regulations for Regulatory Floodplains in Colorado	1/27/17	IS
N/A	Consultant Helper: Permanent Water Quality Report	1/27/17	IS
N/A	CRS 12-25 Professions and Occupations General - Engineers, Surveyors, and Architects	1/27/17	IS
N/A	CRS 24-56-101, The Colorado Relocation Assistance and Land Acquisition Policy, et seq. as supplemented	1/27/17	IS
N/A	CRS 35-7-203, Release of destructive rodent pests	1/27/17	IS
N/A	CRS 37-92-602 (8)	1/27/17	IS
N/A	CRS 38-1-101, Colorado Eminent Domain Act	1/27/17	IS
N/A	CRS 38-1-122, Property – Real & Personal Eminent Domain, Proceedings, Requirements & Limitations, Attorney Fees	1/27/17	IS

Book 3 - Applicable Standards, Data, and Reports

General Standards, Data, and Reports			
Doc#	Document	Date Issued	Availability
N/A	CRS 43-1-1411 Project Specific Utility Relocation Agreements	1/27/17	IS
N/A	CRS 43-1-208, 210 and 43-3-106	1/27/17	IS
N/A	Endangered Species Act	1/27/17	IS
N/A	Environmental Data Resources (EDR) Regulatory Report (2016)	1/27/17	IS
N/A	EPA Storm Water Management Model (SWMM)	1/27/17	IS
N/A	FHWA Corrosion/Degradation of Soil Reinforcements for Mechanically Stabilized Earth Walls and Reinforced Slopes	1/27/17	IS
N/A	FHWA Design and Construction of Mechanically Stabilized Earth Walls and Reinforced Soil Slopes	1/27/17	IS
N/A	FHWA Design Manual for Permanent Ground Anchor Walls	1/27/17	IS
N/A	FHWA DP-90-068 , Permanent Ground Anchors, Volume 1, Final Report	1/27/17	IS
N/A	FHWA Geotechnical Engineering Circular No. 4 – Ground Anchors and Anchored Systems	1/27/17	IS
N/A	FHWA Geotechnical Engineering Circular No. 7 – Soil Nail Walls	1/27/17	IS
N/A	FHWA HI-95-038 "Geosynthetic Design and Construction Guidelines"	1/27/17	IS
N/A	FHWA Highway Traffic Noise: Analysis and Abatement Policy and Guidance	1/27/17	IS
N/A	FHWA Manual for the Design & Construction Monitoring of Soil Nail Walls	1/27/17	IS
N/A	FHWA NH-00-043 Mechanically Stabilized Earth Walls and Reinforced Soil Slopes	1/27/17	IS
N/A	FHWA RD-73-93, Analysis and Design Problems in Modeling Slurry Wall Construction	1/27/17	IS
N/A	FHWA RD-80-047, Slurry Walls as an Integral Part of Underground Transportation Structures	1/27/17	IS
N/A	FHWA RD-82-046, Tiebacks, Executive Summary	1/27/17	IS
N/A	FHWA RD-82-047, Tiebacks	1/27/17	IS
N/A	FHWA RD-92-004, Drilled Shafts for Bridge Foundations	1/27/17	IS
N/A	FHWA SA-93-068, Soil Nailing Field Inspectors Manual-Soil Nail Walls	1/27/17	IS
N/A	FHWA Soil Nailing Field Inspectors Manual	1/27/17	IS
N/A	FHWA Standard Highway Signs	1/27/17	IS
N/A	FHWA Work Zone Operations Best Practices Guidebook	1/27/17	IS
N/A	FHWA, RD-75-114 Safety and Locational Criteria for Bicycle Facilities	1/27/17	IS
N/A	FHWA-CFL/TD-11-003, Wildlife Crossing Structure Handbook: Design and Evaluation in North America	1/27/17	IS
N/A	FHWA-RD-89-198, Soil Nailing for Stabilization of Highway Slopes and Excavations	1/27/17	IS
N/A	Guidelines for Senate Bill 40 Wildlife Certification	1/27/17	IS

	General Standards, Data, and Reports		
Doc#	Document	Date Issued	Availability
N/A	HDS-5, Hydraulic Design of Highway Culverts	1/27/17	IS
N/A	HEC-11, Design of Riprap Revetment	1/27/17	IS
N/A	HEC-12-Drainage of Highway Pavements	1/27/17	IS
N/A	HEC-13, Hydraulic Design of Improved Inlets for Culverts	1/27/17	IS
N/A	HEC-14, Hydraulic Design of Energy Dissipaters for Culverts and Channels	1/27/17	IS
N/A	HEC-15, Design of Roadside Channels with Flexible Linings	1/27/17	IS
N/A	HEC-18, Evaluating Scour at Bridges	1/27/17	IS
N/A	HEC-20, Stream Stability at Highways	1/27/17	IS
N/A	HEC-21, Design of Bridge Deck Drainage	1/27/17	IS
N/A	HEC-22, Urban Drainage Design Manual	1/27/17	IS
N/A	HEC-23, Bridge Scour and Stream Instability Countermeasures Experience, Selection, and Design Guidance	1/27/17	IS
N/A	HEC-24, Highway Stormwater Pumping Station Design	1/27/17	IS
N/A	http://uspseverydoordirectmail.com	1/27/17	IS
N/A	International Building Code	1/27/17	IS
N/A	Landslides: Investigation and Mitigation, TRB Special Report 247	1/27/17	IS
N/A	Larimer County Procedural Guide for Floodplain Special Review	1/27/17	IS
N/A	Larimer County Stormwater Design Standards (Addendum to UDFCD Criteria Manual)	1/27/17	IS
N/A	Larimer County Stream Crossing Guidance	1/27/17	IS
N/A	Larimer County Urban Area Street Standards	1/27/17	IS
N/A	Loveland Power, Requirements for Electrical Service	1/27/17	IS
N/A	Loveland Power, Street Lighting Standards	1/27/17	IS
N/A	Migratory Bird Treaty Act	1/27/17	IS
N/A	MUTCD, Manual of Uniform Traffic Control Devices	1/27/17	IS
N/A	National Cooperative Highway Research Project (NCHRP) Bridge Life-Cycle Cost Analysis	1/27/17	IS
N/A	National Cooperative Highway Research Project (NCHRP) Report 12-43 Life-Cycle Cost Analysis for Bridges	1/27/17	IS
N/A	National Cooperative Highway Research Project (NCHRP) Report 350, Recommended Procedures for the Safety Performance Evaluation of Highway Features	1/27/17	IS
N/A	National Cooperative Highway Research Project (NCHRP) Report 402, Fatigue Design of Modular Bridge Expansion Joints	1/27/17	IS
N/A	National Electrical Manufacturing Association (NEMA) Standards and Specifications	1/27/17	IS
N/A	National Institute of Standards and Technology (NIST) Bridge	1/27/17	IS

General Standards, Data, and Reports			
Doc#	Document	Date Issued	Availability
	LLC		
N/A	NFPA 1, Fire Code	1/27/17	IS
N/A	NFPA 101, Life Safety Code	1/27/17	IS
N/A	NFPA 70 National Electric Code	1/27/17	IS
N/A	NOAA Precipitation Frequency Atlas of the United States, Volume 8	1/27/17	IS
N/A	OmniTRAX Technical Specifications for Industrial Tracks	7/14/2017	IS
N/A	Ordinance Concerning Noise Levels in Unincorporated Larimer County (Ordinance No. 97-03)	1/27/17	IS
N/A	OSHA Standard Specifications	1/27/17	IS
N/A	Resource Conservation and Recovery Act (RCRA)	1/27/17	IS
N/A	Retroreflective Sheeting Materials Guide	1/27/17	IS
N/A	RTD Bus Transit Facilities Design Criteria	1/27/17	IS
N/A	RTD Light Rail Design Criteria	1/27/17	IS
N/A	Rules and Regulations of the CDOT Pertaining to Accommodating Utilities in the State Highway Rights of Way	5/12/17	IS
N/A	State of Colorado, Amerco Supreme Court Case No.16SA75	1/27/17	S
N/A	State of Colorado, State Highway Access Code	1/27/17	IS
N/A	The Colorado Supplement to the Federal Manual on Uniform Traffic Control Devices	1/27/17	IS
N/A	The Uniform Relocation Assistance and Real Property Acquisition Policies Act of 1970, as amended	1/27/17	IS
N/A	Town of Windsor Storm Drainage Design Criteria	1/27/17	IS
N/A	Transportation Research Board Highway Capacity Manual	1/27/17	IS
N/A	UDFCD Design of Low Tailwater Riprap Basins for Storm Sewer Pipe Outlets	1/27/17	IS
N/A	UDFCD Urban Storm Drainage Criteria Manual	1/27/17	IS
N/A	USACE Wetland Delineation Manual	1/27/17	IS
N/A	USFWS Guidelines on Preble's Jumping Mouse	1/27/17	IS
N/A	Xcel Energy Outdoor Lighting Manual	1/27/17	IS